

WHAT IS CLAIMED IS:

1. A measurement system comprising:
an analyzer unit; and
at least one replaceable sensor,
wherein each sensor comprises a transponder in which sensor-specific data is stored,

wherein the analyzer unit comprises an antenna for wireless readout of the data stored in the transponder and for wireless transmission of power required to operate the transponder, and

wherein a measurement signal of the sensor is transmitted by wireless transmission via the transponder to the antenna of the analyzer unit.

2. The measurement system as recited in Claim 1, wherein the sensor further comprises an electronic circuit, which converts the measurement signal of the sensor for wireless transmission to the antenna of the analyzer unit.

3. The measurement system as recited in Claim 2, wherein the electronic circuit converts the measurement signal of the sensor into a digital value and transmits this digital value to a memory of the transponder.

4. The measurement system as recited in Claim 2, wherein the antenna of the analyzer unit also supplies power for operating the electronic circuit, which converts the measurement signal of the sensor.

5. The measurement system as recited in Claim 1, wherein the transponder of the sensor is accommodated in a connecting unit, wherein the connecting unit is configured to be secured to a corresponding mating component of the analyzer unit,

and wherein the antenna of the analyzer unit is situated in a vicinity of the mating component.

6. The measurement system as recited in Claim 5, wherein the mating component comprises a stand clamp, which is connected by a cable to further components of the analyzer unit, and wherein the stand clamp is configured to secure the connecting unit of the sensor in a clamp connection.

7. The measurement system as recited in Claim 5, wherein the mating component comprises a slot configured to slidably receive the connecting unit from an insertion direction.

8. The measurement system as recited in Claim 5, wherein the mating component comprises an opening configured to receive the connecting unit from a direction axial to the opening.

9. The measurement system as recited in Claim 5, wherein the connecting unit and the mating component comprise respective complementary surfaces.

10. The measurement system as recited in Claim 9, wherein the respective complementary surfaces are flat.

11. The measurement system as recited in Claim 9, wherein the connecting unit is held to the mating component by a compression spring.

12. The measurement system as recited in Claim 9, wherein the connecting unit is held to the mating component by magnetic forces.

13. A measurement system comprising:

an analyzer unit; and

at least two sensors,

wherein each sensor comprises a transponder in which sensor-specific data is stored,

wherein the analyzer unit comprises an antenna for wireless readout of the data stored in each of the transponders and for wireless transmission of power required to operate each of the transponders,

wherein respective measurement signals of the sensors are transmitted by wireless transmission via the transponders to the antenna of the analyzer unit, and

wherein the analyzer unit additionally comprises electronics, including identification software, for differentiating the respective measurement signals of the sensors and for analyzing the differentiated measurement signals.